

Georgia, and 20 miles south of Aiken, South Carolina (Figure 1). Approximately 90 percent of SRS land consists of natural and managed forests.

The SRS was constructed during the 1950s to produce the basic materials used in the fabrication of nuclear weapons, primarily tritium and plutonium, in support of our nation's defense programs. Production of nuclear materials for the defense program was discontinued in 1988. SRS has provided nuclear materials for the space program, as well as for medical, industrial, and research efforts. Chemical and radioactive wastes are by-products of nuclear material production processes. These wastes have been treated, stored, and in some cases, disposed of at SRS. Past disposal practices (e.g., seepage basins, pits and piles, landfills, etc.) have resulted in soil and groundwater contamination.

<i>Site Chronology</i>	
1989	<i>SRS included on the National Priorities List as needing a long-term cleanup plan.</i>
1993	<i>Federal Facility Agreement established with the USDOE, USEPA – Region 4, and the SCDHEC to coordinate remedial actions at SRS into one comprehensive regulatory program.</i>
1997	<i>First SRS Five-Year Remedy Review is issued.</i>
2004	<i>Second SRS Five-Year Remedy Review is issued.</i>
2009	<i>Third SRS Five-Year Remedy Review is issued.</i>
2014	<i>Fourth SRS Five-Year Remedy Review is issued.</i>
2015	<i>Fifth SRS Five-Year Remedy Review for SRS OUs with Native Soil Covers and/or LUCs (Phase 1) is issued.</i>
2017	<i>Fifth Five-Year Remedy Review for SRS OUs with Groundwater Remedies (Phase 2) is issued.</i>
2018	<i>Fifth Five-Year Remedy Review for SRS OUs with Engineered Cover Systems (Phase 3) is issued.</i>
2018	<i>Fifth Five-Year Remedy Review for SRS OUs with Geosynthetic or S/S Cover Systems (Phase 4) is issued.</i>
2018	<i>Fifth Five-Year Remedy Review for SRS OUs with Operating Equipment (Phase 5) is issued.</i>
2019	<i>Sixth Five-Year Remedy Review for SRS OUs with Native Soil Covers and/or LUCs (Phase 1) is issued.</i>

What are the Cleanup Objectives?

Remedial goals are defined for individual OUs, but generally support the following cleanup objectives:

- To prevent unacceptable exposure of human receptors and ecological receptors to contaminants in soils and groundwater.
- To prevent or minimize the migration of contaminants from soils to groundwater at levels that exceed groundwater maximum contaminant levels (MCLs).
- To prevent or minimize the discharge of contaminated groundwater to surface water at levels that exceed MCLs.

Major Developments Since Last Five-Year Remedy Review

- The Fifth Five-Year Remedy Review Report included the L-Area Burning/Rubble Pit (131-L), Gas Cylinder Disposal Facility (131-2L) and L-Area Rubble Pile (131-3L) (LBRP) OU. However, the USEPA and SCDHEC approved USDOE's request to 1) discontinue monitoring and reporting at the LBRP OU; and 2) designate LBRP OU as a No Action OU, since groundwater contamination no longer exceeds regulatory limits. Therefore, the LBRP OU is not discussed in the Sixth Five-Year Remedy Review Report for SRS OUs with Groundwater Remedies.
- 1,4-Dioxane was added to the annual groundwater monitoring at three wells (DOB 15, DOL 2, and DOB 16) for the DOSB OU to collect sufficient trend data.
- Groundwater monitoring at the RAOU will focus on the most mobile constituents (carbon-14, chlorine-36, iodine-129, and tritium) every five years at ten in-situ decommissioning wells based on regulatory approved recommendations in the *Addendum to the Effectiveness Monitoring Plan (EMP) for the R-Area Operable Unit*. In addition, carbon-14 and tritium will be monitored annually for five years (2018 to 2022) at five wells because carbon-14 was detected in one sample in 2017. Monitoring for 1,4-dioxane is no longer required at RAOU based on monitoring results and ~~regulatory agreements~~ as agreed to by the approved *R-Area Groundwater (NBN) Effectiveness Monitoring Report in Support of R-Area Operable Unit (U) January 2015 through December 2015 and subsequent comment responses*. Starting in 2018, the reporting requirements for RAOU were revised from annual to biennially.

Protectiveness Summary

- All remedies were determined to be protective of human health and the environment.
- The ERH with SVE interim remedy for the CAGW OU was determined to be protective of human health and the environment in the short-term. However, in order for the remedy to be protective in the long-term, additional remedial actions, including LUCs (if needed), will need to be implemented. SRS facility security and administrative controls that restrict unauthorized access to the CAGW OU are not part of the interim remedy and therefore not recognized as long-term protective. SRS will include CAGW OU in Appendix A of the Federal Facility Agreement (FFA) Annual Progress Report to demonstrate long-term protectiveness through the SRS facility security and administrative controls. The report is required by the FFA and includes annual certification by the USDOE SRS Manager that the listed OUs are in compliance with land use requirements.

Next Five--Year Remedy Review

The Seventh Five-Year Remedy Review Report for SRS OUs with Groundwater Remedies is due in January 2026.

For More Information

For more information regarding the complete SRS Sixth Five-Year Remedy Report for SRS OUs with Groundwater Remedies, please contact:

~~Janet Griffin~~ Angie Benfield
Savannah River Nuclear Solutions, LLC
Public Involvement
Savannah River Site
Building 730-1B
Aiken, South Carolina 29808
(803) 952-8467 9830
~~janet.griffin~~ angela.benfield@srs.gov